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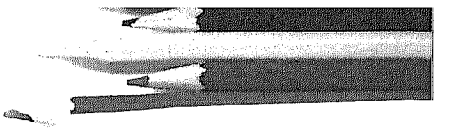

4

REFLECTING AND ACTING ON TEACHING AND LEARNING IN DIVERSE CLASSROOMS

INTENDED LEARNER OUTCOMES

As a result of working through this chapter the reader will be able to:

- Reflect on the teaching behaviours, knowledge and skills you possess or aspire to possess.
- Identify areas that you need to develop and access relevant materials in this book and elsewhere to assist you.
- Set specific personal and classroom goals to work towards to maximise learning outcomes.
- Use action research as a means of promoting positive change in your classroom.

Overview

In Chapter 2 we discussed the wide range of factors that influence and contribute to the diverse modern classroom. In this context, it is clear that teachers face a demanding task in maximising learning for all their students. The heterogeneous abilities and needs of children and youth in regular Australian classrooms represent both an opportunity for the development of cooperation, inclusiveness and participation, and a major challenge to the professional skills and expertise of classroom teachers. In Chapter 3 we explored the research base for the principles and strategies of effective teaching covered throughout the remaining chapters of the book.

In this chapter we focus on the question: *how can I improve curriculum, instruction and the nature of the learning environment in my classroom in order to maximise student learning outcomes?* This is a question that is relevant for all early school, primary and secondary teachers regardless of the level of outcomes achieved by students. In other words, the question highlights the fact that we can always do more to assist students in the complex process of learning in order to equip them with the skills, knowledge and values they need for life. Note that we are emphasising total student learning with particular attention to the development and use of social, cognitive, physical and emotional abilities at school and beyond school.

The goal of the remainder of this book is to provide you with a means of identifying strategies and processes you can introduce into your teaching to address this issue of maximising learning. To achieve this we will integrate a review of recommended educational practices with case studies contributed by classroom practitioners, with the intention of assisting you to evaluate and develop the quality of your

work as a teacher. Chapter 5 will explore curriculum strategies, Chapter 6 instructional strategies and Chapter 7 aspects of the learning contexts or environments that support effective teaching and learning. The final chapter, contributed by Bob Conway, broadens the book by assisting us to understand the process of change in our own practices in the context of wider school and system initiatives.

First though, we must identify our personal needs, priorities and goals as a means of navigating this book and establishing a direction for our professional development as teachers. In this chapter, we spend some time considering the notion of the teacher as a reflective practitioner, who constantly evaluates and modifies their daily behaviours to meet student needs (Diezmann, 2005). A three-part inventory that can assist in this reflective process is introduced, and in the closing activities you will be encouraged to complete a follow-up assessment of your personal and situational needs in the classroom. It is vital to note that although we have identified the three domains of curriculum, instruction and learning contexts, reflection and change in our practices is almost always a complex and fluid process that involves an interaction of all three domains within a school environment (as we saw in Figure 2.4).

Finally, we pay brief attention to the action research methodology that can be effective in bringing about systematic and positive change in classrooms.

The reflective teacher practitioner

BOX 4.1: PATRICIA PONDERS

Patricia wandered back to the staffroom for teacher release after her Human Society and its Environment lesson with a Year 5/6 class. Maybe a coffee would help clear her head. Something was nagging her. Why did so many of her students look confused when she asked them questions in the final phase of the lesson? She thought she'd done a good job of explaining the new material. Still, there were some positives. Sam had raised some very useful ideas during discussion – he's showing good leadership of his study group.

Figure 2.4 in Chapter 2 illustrated the interaction between a number of key variables associated with learning outcomes in regular classrooms. Teachers must recognise and accommodate a plethora of societal, cultural, political, familial and individualised factors in the worlds of the students with whom they interact, and for whom they are educationally responsible (see Arthur-Kelly, Lyons, Butterfield & Gordon, 2007 for an exploration of this notion of ecological complexity). Accommodating and making sense of these complex factors requires teachers to regularly reflect on teaching and learning in their classrooms.

THINK ABOUT THIS

Do you believe teaching is more complex today than when you started school as a student? Explain your response.

Interest in the concept of the reflective teacher practitioner has increased in recent years for a number of reasons, including the research agenda on effective instruction we reviewed in Chapter 3. Increasing accountability has also played a role in ensuring that teacher education courses embed this notion of dynamic practice in teacher training as part of the broader process of accrediting the teaching profession

(see, for example, NSW Institute of Teachers, 2005; Ramsey, 2000). Educational systems, likewise, have embraced the importance of teacher professional development and reflection based on the matching of current and best practice and illustrated in the Quality Teaching project in NSW (NSW Department of Education and Training, 2003), and the Productive Pedagogies initiatives in Queensland (Gore et al., 2001).

In this section we consider the central role of reflection in the daily professional lives of teachers. Later we review the importance of connecting insight (i.e. understanding that may develop from reflection) to action. If reflection is an essentially passive process, then action research is, as the name suggests, the opposite. We will consider the process and the challenges facing the teacher who decides to reflect on their practices and target specific areas using action research methodology.

So, what is a reflective teacher practitioner? For our purposes it is a person who is able to stand back from what they do in their daily work with students, consider their students' learning, analyse their own strengths and opportunities for improvement, and importantly, profile this information against the established knowledge base on effective teaching and learning. As we noted earlier, it is one thing to ponder needs and solutions (passive), and quite another to do something about it (active). However, the following quote demonstrates that reflection and action are intertwined:

> The notion of teachers as reflective practitioners and researchers is central to the improvement of practice. When teachers reflect upon their own practices, recognize their professional development needs, introduce and evaluate changes and assist others in this process, or participate in system-wide innovation and evaluation, they acknowledge the importance of lifelong learning and professional growth (Arthur-Kelly et al., 2007, p. 42).

An ability to critically analyse one's own skills and motivations is a defining feature of a person who is an effective and reflective practitioner. It is one thing to know what the research says about good teaching, meaningful curriculum and positive learning environments in relation to student learning. It is another thing to be able to map our daily behaviours against this knowledge in an honest and self-appraising way, with a view to self-affirmation, recognition of needs and strategic change. The inventory we present a little later in this chapter is an attempt to assist the reader in this process.

THINK ABOUT THIS

Do you make time in your day to reflect on what you have done or are currently doing? Do you need to plan for reflection?

There are many factors that can interrupt or assist in the challenge of self-reflection. These are now briefly considered.

Barriers and gateways to reflection

Without doubt, time is the greatest impediment to reflection and analysis. The daily work of teachers in the diverse classroom is full of demands that work against the opportunity or inclination to ponder what is working and what is not. Allied to this is the provision of leadership at a school and system

level that encourages and supports reflection and goal-setting. Another significant factor may be the learned habits we adopt throughout our careers. Current teacher preparation places heavy emphasis on the value of teachers being able to view their work from a distance and identify specific areas for change and development through systematic research (Diezmann, 2005), but many experienced teachers may not have had such encouragement and therefore reflection may not necessarily inform their work habits as well as it should.

As we will see shortly, personal reflection should lead to goal-setting, action and ongoing evaluation. Recent attention to the potential value of mentoring in pre-service teacher preparation underlines this point (Harrison, Lawson & Wortley, 2005; Le Cornu, 2005). Reflection will often be best informed by input from those for whom we have respect and people who can relate to our reality (for example, our peers). Likewise, the opportunity to set some goals, for our own development of skills, knowledge and practices, is central to a transformative approach to teaching. The scene is then set for *meaningful personal change in professional practice* and a related priority may be *situational change*. Some aspect of the learning context, curriculum or instructional design in the classroom may impact on the degree to which a personal goal can be realised. For example, a teacher who plans to increase the support provided to a particular group of students may find that their teacher's aide has been deployed to another class. As we noted in Figure 2.4 there is a constant interplay between teacher, student, systemic and other influences on the teaching and learning process in the classroom. Read Box 4.2 with these points in mind.

BOX 4.2: AN EXAMPLE OF TEACHER REFLECTION AND GOAL-SETTING

Patricia, a primary classroom teacher with many years experience in large and small schools, has had a Gestalt. Maybe it was the coffee and the fact that the staffroom was empty at the time! She reflected on several exchanges she'd had with her students in the last lesson and came to the conclusion that she may need to pace and clarify her in-class questioning techniques, and delay providing assistance to allow students' thinking time. It struck her that this was especially a problem in the Human Society and its Environment Key Learning Area but she had noticed the same confused look on her students' faces in other Key Learning Areas. Patricia's supervisor entered the staffroom which provided her the opportunity to run through her ideas. The outcome was that she set herself a target of clear, one-component questions. She had also decided to wait for a longer period before repeating the question, providing a hint or some other assistance to students, if necessary. She was looking forward to her next lesson to try this strategy.

An inventory of recommended classroom practices

As discussed earlier, the process of reflection on teaching involves attention to both what we and our students do in the classroom, as well as what the research tells us about effective teaching strategies. Our attention now turns to this latter component of reflection through the introduction of a practical inventory of recommended practices for use in the classroom. These practices are linked to the three core areas that form the heart of teaching life: curriculum, instruction and the learning context (see Figure 2.4). It is important to emphasise that this inventory is a representative, but not exhaustive, list. However, the selection of items is based on a review of the established research and practice literature about effective teaching and learning processes, with definitions, indicators and examples informed

by our experience in the field. The reader interested in a comprehensive treatment of the features of effective teaching should look at the work of Good and Brophy (2000) and Algozzine, Ysseldyke and Elliott (1997). Also Fuchs and Fuchs (2005) analyse the difference between acceptable and best practices in classroom teaching and learning processes.

There is one final point to make before we look at each section of the inventory. The indicators listed here are generic to recommended teaching practices. They are not listed because they are especially relevant to, or effective with, any one group of learners. Rather, the effective teacher analyses the impact of each aspect of curriculum, instruction and learning contexts with respect to the various needs of the students in his/her classroom, and designs programs that are tailored to that particular group. Most importantly, as Patricia found in our vignette (Box 4.2), it is in the combination of curricular, instructional and contextual items that the answer to most given teaching challenges usually lies. Reflection and action research can assist the teacher to maximise learning outcomes.

We present each of the three areas of curriculum, instruction and context separately, listing selected item names, definitions and observational indicators that will assist you to evaluate the degree to which the item is present in your classroom and an example for each item. Each *item* is a statement of the core issue relating to that domain. For example, the first item in the curriculum section is that the curriculum outcome is achievable for students. We then provide a brief *definition*, and some *observational indicators* that will help you determine whether that item is present in your classroom practices. Finally, an *example* for each item is provided.

THINK ABOUT THIS

As you read through each item below, we encourage you to reflect on your skills, knowledge and dispositions, and ask the following questions:

- How important is this item for your emerging and existing teaching skills and knowledge?
- Can you identify goals for personal or classroom/situational development for some of the items?

Curriculum

In broad terms, *curriculum* refers to the content focus of our lessons. Guided by syllabus documents and student needs, the teacher has the important responsibility of selecting, structuring and organising for instruction the particular curriculum outcomes they are targeting. We noted earlier that the type of curriculum presented to students will be influenced by factors such as their individual achievements to date, predetermined outcomes set down by the relevant educational authority, and for some students with additional needs, the priorities and goals established in an individualised educational plan (see Foreman, 2005).

As Table 4.1 suggests, there are many things to consider when undertaking planning for the curriculum. The complex ecology of the modern diverse classroom means that it is vital to connect learning outcomes and learning processes, influenced by how teachers teach (instruction), the conditions under which learning occurs (context), and of course, individual learning histories and attributions towards failure or success. For example, the degree of motivation in young students to master a curriculum target such as counting orally from 1–10 will be a function of past learning experiences ('was I successful or do I feel

Table 4.1 Recommended practices for curriculum

Item	Definition	Observational indicators	Example
Curriculum is: 1. Achievable	Each student can master targeted learning outcomes.	Student is actively engaged with the set task and demonstrates a high success rate.	Brittany was confident to attempt the difficult comprehension questions because she had successfully read the passage out loud several times as well as silently.
2. Engaging and motivating	Material presented is developmentally appropriate, stimulating and appealing to students.	A wide range of text types, materials and other resources is accompanied by relevant teacher language and recognition of different learning preferences.	Using humour, visual examples and physical activities, Mrs Parsons engaged her Year 2 students in role plays about social distance when having a conversation, in order to target Personal Development learning outcomes.
3. Connected to prior learning	Prior to introducing new material, some form of review and linkage to past learning is made.	Discussion between teacher and students, questioning, small group brainstorming, brief written task.	Using the stem 'you recall that yesterday we... ' the teacher of 9H, Mr Corbett, leads a brief discussion of the material covered on the history of India before introducing new concepts related to the impact of the Colonial British Empire on the social structure of the country.
4. Presented at varying cognitive levels of complexity dependent on student ability	Knowledge and skills are tailored to the varying cognitive (thinking) processes of students, and deep learning is promoted as much as possible.	A range of tasks and expectations of students are evident and they are presented using a variety of media and materials.	Mr Blainey used Bloom's Taxonomy (Anderson & Krathwohl, 2001) to guide his goals for students in his Year 3 class. Some activities for Group A in Human Society and its Environment involved the basic recall of facts, others were aimed at application of knowledge to life tasks, and for a few students, some evaluative work in the form of self-assessment of skills was provided.
5. Relevant to whole of life	The functional value of learning outcomes for current and future life activities is emphasised.	Students have the opportunity to describe connections between curriculum material and a variety of current and potential life experiences.	In their work on the value of Australian currency, students in 2G role play occasions when they will purchase items at a shop with their parents and independently.

6. Linked to other syllabus areas	The integration of material so that students understand and can identify connections in their learning experiences.	The teacher states or uses questioning to elicit relationships between what is being taught and relevant aspects in other curriculum areas.	As the Year 10 Food Technology students were about to get into groups to discuss the advantages and disadvantages of food nutrition labelling, Ms Sims asked the class to briefly check the readability of the text and numerical information provided on a sample of everyday food items.
7. Directed to daily life activities	The degree to which a student is able to articulate what they are learning in terms of the reality of their daily lives.	Students demonstrate a sense of purpose in learning tasks and can discuss at some level the purpose of the skills and knowledge in life activities.	Mrs Perkins occasionally asked her Year 7 Maths class the question 'Why is this important to us?' during lessons, and she provided some examples of how the Maths skills related to out-of-school activities her class were involved in when they were unable to answer the question.
8. Challenging but achievable in light of student ability	The overall goal is to promote student learning at individually challenging levels. Teacher support is available to scaffold learning.	Curriculum content is observed to extend students without over-reaching. Supports are in place to facilitate student mastery of learning outcomes.	John is teaching Year 5 science and ensures that his questioning of individual students on the topic of liquid/solid/gaseous substances includes 'how' and 'why' dimensions without over-extending the depth of the challenge for each person. He also provides verbal assists such as hints to promote learning rather than immediately providing the answer.
9. Sequenced to promote success	The scope and sequence of curriculum is central to promoting teaching and learning in small steps that target successful engagement for students.	Usually available in syllabus documents, curriculum is listed from easy to hard and reflects a process of cumulative learning.	By breaking each outcome listed in the syllabus into smaller components (task analysis), Mrs Hogg was able to ensure that the students in her various ability groups were working on Mathematics tasks that built on previous work and enabled mastery of more complex concepts and abilities.
10. Connected to future topics	The introduction of some form of cognitive organiser that links prior, current and future topics for the learner.	The teacher can be observed to scaffold student understanding using visual, verbal or other types of aids.	10R History completed a small group mindmap and timeline for 16th-century English wars in preparation for new material on the 17th-century alliances England forged with European nations.

like I failed?'), how the teacher approaches the instructional challenge ('I can see my students are fully engaged with practicing this skill'), and the provision of relevant supports in the learning context ('I can see Susan needs more one-to-one practice').

To highlight this point, as you read through each item in Table 4.1 ponder your own schooling experiences. How important were your beliefs about the content you covered in various classes at school, the behaviour of teachers, and the environmental supports for learning, and what was the relationship between these considerations and your level of success in various key learning areas?

Instruction

As we have stressed throughout this book, it is best to view teaching as a complex process that reflects a synergy of instructional, curricular and contextual considerations. *Instruction*, the delivery of curriculum content to the learner, is the subject of a vast research and practice database, as we noted in Chapter 3. Regardless of the level of teacher control of instruction, it is clear that student characteristics and teacher behaviours are central elements that influence the delivery of instruction. Some methods of instruction are totally student-mediated (for example, self-directed topic navigation using the Internet) and others are entirely teacher-focused (for example, Direct Instruction). Others fall somewhere between these extremes and require strong teacher facilitation of socially scaffolded learning (for example, cooperative learning). The point to be made here is that the cognitive, social, affective and other abilities of students in your class will influence how you match up the teaching strategies you select and implement and the target curriculum. Likewise, your own philosophy of teaching and knowledge of how your students learn most effectively will inform your pedagogical decision-making.

In Table 4.2 we consider a range of recommended practices for instruction. As you read through them, make links to your teaching experiences and to the related domains covered in Tables 4.1 and 4.3. You may especially like to evaluate how your personal beliefs about the role of a teacher shapes how you plan to deliver instruction in the diverse classroom.

Learning contexts

Curriculum and instruction do not happen in a vacuum. We can identify learning outcomes to form the focus of our lessons and we can select appropriate instructional approaches. However, the nature of the environment (the 'where') in which we tackle the 'what' and 'how' of teaching is equally as powerful a consideration in maximising learning outcomes, as we see in Table 4.3.

Actually, learning contexts are much more than physical locations. They comprise the people, the physical and aesthetic features of the area in which teaching and learning take place, variations to the physical layout throughout the day, the communication ecology, the proximity of others and so on. With this point in mind, cast your mind to learning contexts you have experienced in your own education. Were some situations sterile and unappealing? Why? What were the implications for your learning and your level of motivation?

Were there other 'rich' contexts you can recall? What made the latter experiences so appealing? Was it the fact that you worked with people you got along with, the teacher had a positive and affirming interpersonal style, and the curriculum was achievable and interesting? Clearly, what we teach, how we teach and the circumstances that surround this process are vitally connected, a point highlighted in Table 4.3.

Table 4.2 Recommended practices for instruction

Item	Definition	Observational indicators	Example
Instruction is: 1. Matched to individual student needs and performance	As far as possible the teacher tailors the cognitive, physical and social demands of learning to the current ability level of each student and their daily performance.	The teacher is seen differentiating materials, levels of explanation and instructional support to address individual needs, based on work samples, observation and other forms of progress data.	In his Year 5/6 class of 31 students, Mr Johnson could not individualise instruction. What he could do, however, was adjust the level of task difficulty in his worksheet tasks to four main ability groups, by staging the series of activities in a cumulative way, from easy to hard. He then closely monitored students he considered in need of extension or extra learning support.
2. Delivered in ability and mixed groups when appropriate	Use of different student groupings including those of the same ability and those comprising students of different ability to facilitate social supports for learning, independent practice and application of new skills.	A major indicator of productive group work is task-focused conversations and evidence of input from all participants.	Previous efforts at group work with junior secondary classes had been a disaster for Mr Priest. This time he spent several sessions with 9P working on the various social skills required of group work and especially role definition. So far the project work he had introduced on climatic changes in the Australian desert system was working well, with students showing improved respect for each others' opinions.
3. Supported by positive reinforcement	The delivery of positive reinforcement (a preferred consequence for the student) during instruction aids in the acquisition and mastery of skills and knowledge.	The teacher praises a student for a contribution to the lesson. This can be expected to encourage that student and their peers to continue working (so long as praise and social attention is perceived by the student as a preferred consequence).	Mrs Dubois smiled at Jackson and thanked him for correctly naming the current prime minister of Australia during a lesson on Federal government structures.
4. Material presented clearly	Information is delivered and explained by the teacher using language that is developmentally and culturally appropriate and accessible to the learner.	The teacher doesn't continually repeat information in slightly different ways, suggesting that there is a good match between student understanding and the delivery of material.	Michael Arthur-Kelly was keen to elaborate on the topic of task analysis to his 3rd year university teaching class. The problem was he defined the central term slightly differently every time, and caused more confusion than clarity. That all stopped when a student raised his hand and tactfully suggested ...'Michael, rule number 1, when you're in a hole, stop digging!'

Table 4.2 Recommended practices for instruction – *Continued*

Item	Definition	Observational indicators	Example
5. Balanced across guided and independent practice	The provision of appropriate learning supports including repeated cues (triggers to performance) and different types of prompts (assists to help performance) to ensure learner success.	If a student is not willing to try a task until some form of assistance is provided, it may be because they are dependent on that assistance. Careful analysis of performance will identify for the teacher exactly how much support is needed to assist in the achievement of independent skills.	Miss Benson found herself needing to constantly hover around Chloe before she would attempt her Level 4 Reader comprehension questions. Chloe usually asked for assistance from Miss Benson once an independent activity was given. After handing out the music worksheet, her teacher asked Chloe to repeat the directions for the whole class and then busied herself on the other side of the room. Chloe completed all 10 questions correctly and independently, with no peer or teacher support, so Miss Benson quietly complimented her as she left the class.
6. Flexible to allow student exploration of concepts and accommodate the use of a range of learning materials and activities	By recognising individual differences, the effective teacher builds in opportunities for meaningful learning that is maintained over time, including recognition that there are different ways to engage with curriculum materials.	The teacher gives some students more time to become fluent on a skill or concept and extends other students using a range of experiences including verbal, visual and other types of stimuli. Flexible design of worksheets, group tasks and follow-up activities will demonstrate planning to accommodate these diverse needs.	Ms Gately prepared one worksheet with eight sections on it for her Year 11 Hospitality students. This meant that more competent students could complete the basic work and be guided to extension work, and others could take longer to complete the first four modules only. There were several students for whom a short verbal discussion with Ms Gately provided a more appropriate means of demonstrating understanding and achievement of the learning outcomes.
7. Incorporates teacher questioning to check student understanding	The use of a variety of different questioning techniques including whole group, small group and individual levels, and those focused on different cognitive levels including knowledge recall, evaluation and synthesis, in order to maximise student learning.	The teacher can be observed to ask students about what it is they are learning, why this material is important and how it might be applied to other curriculum areas.	In his Year 11 Ancient History class Mr Archer had found that higher-order questioning of individual students was one of the best ways to extend student mastery of various knowledge domains. For example, 'Jess, can you help us to understand why the early Egyptian civilisation lasted for so long, and what brought about its downfall?'

Table 4.2 Recommended practices for instruction – *Continued*

Item	Definition	Observational indicators	Example
8. Well paced	The timing of various parts of the lesson to reduce student boredom or confusion and maximise engagement with the material presented.	Usually it is easy to tell if students are bored by looking for off-task behaviours such as hitting others, gazing around or whispering to peers. It is also possible that these behaviours may occur if the material is being covered too quickly.	Although he had been teaching for several years, Mr Abernathy found that pacing was one of the hardest pedagogical skills to master. If he went too quickly, he lost some students. When he laboured the point, others were frustrated. He had concluded, in light of feedback from a respected peer, that each class was different and so he had to constantly evaluate and modify this behaviour in light of the student characteristics, type of content to be covered and his own daily reflections on lessons presented.
9. Presented in small steps without learner frustration	The presentation of content and learning activities that challenges but does not overwhelm the learner.	When students are nodding and their manner is positive it will often mean that they are understanding and connecting the material being presented to their own schema.	Like his challenges with pacing, Mr Abernathy had found that constant analysis of what he was teaching and how his students were responding produced the highest quality outcomes. By task-analysing outcomes and teaching in sequenced 'chunks' he had found that student involvement in and mastery of learning was enhanced.
10. Inclusive of content review processes	Effective instruction produces cumulative learning and so it is vital to clearly review each concept and skill before introducing new material when data indicates students are ready.	The teacher verbally overviews the material covered and links it to prior and future outcomes.	'Let's just recall what we have covered today', said Ms Black, before noting the students who were struggling with the content and indicating to her Year 7 students that they could now start to pack up their materials and prepare for their next lesson.

Table 4.3 Recommended practices for learning contexts

Item	Definition	Observational indicators	Example
The classroom context supports: 1. Seating to promote learning	Varying the physical location of students in the classroom to facilitate learning.	Teachers use different grouping arrangements dependent on the goals of the lesson and the skills of their students.	In one classroom students were seated in traditional rows and the teacher was delivering information verbally. Down the hallway, another class was engaged in cooperative learning activities and so tables were organised to allow four groups of six students to discuss their topic.
2. Codes of conduct/rules	The establishment of a clear set of expectations for behaviour.	In some settings, there will be a visual display of the code. However, in all settings there will be verbal reminders, positive and (if necessary) negative consequences of some type for the behaviours students display.	Class 3R discussed the main rights, roles and responsibilities shared by all members of the class. After lengthy discussion facilitated by the teacher, a code was developed and written onto a board that was displayed at the front of the class. It was then referred to by students and teacher alike. Typical of many classes he had taught, the teacher, Mr Head, found his students were tougher on each other than he was ...
3. A stimulating physical environment	Wherever possible visual displays of student work and other materials are available to stimulate thinking and promote ownership of the learning space.	Visual displays can be observed and function to celebrate the achievement of students, reinforce learning outcomes, and encourage students to think deeply.	In each of his secondary Maths classrooms, Mr Kelly always attempted to hang up some graphs, grids or other resources related to the learning outcomes he was targeting.
4. Effective and quick transitions	Movement from one activity to another or one area of the school to another as quickly and calmly as possible.	A minimal amount of time is spent by the class when moving around the classroom and school environment.	One of the things Mrs Hicks had noticed about her Senior Year 12 students was their ability to move to a new location or task quickly ... now if only the same could be said of Year 8 French ...
5. Transparent routines	Everyone in the classroom is aware of the daily routines, including cues before major transitions.	A visual timetable and verbal cues are used by the teacher to highlight the need to change from one activity, location or grouping to another.	Mr Giles had discovered that if he pointed to the classroom timetable and stated 'OK, in two minutes we are moving', Class 3G would transition with minimal disruption and opportunity for silly behaviour, thus increasing the amount and quality of learning time.

6. A plan for when disruptions occur	The ability to be proactive rather than reactive when disruption to learning occurs.	In addition to a calm disposition, a teacher who has a plan avoids overreactions and is not distracted by student attempts to inflame the situation.	'It had to happen sometime ...' thought Mr Hardy as he observed three boys at the back of his Year 6 classroom furtively passing notes to each other with much giggling. He activated Plan A and immediately produced a positive consequence for the remainder of the class in the form of a favourite DVD, effectively reinforcing on-task behaviour with accompanying verbal praise.
7. Positive communication and interaction processes	Interaction style among all members of the classroom community that reflects dignity, respect and support.	The verbal tone, body language and actual content of communications between teachers and peers provides observable markers of the health of interactions in the learning context.	Ms Plant had set herself a goal to focus on a positive and affirming tone when engaging with her most difficult student, Jacob. Whenever possible she praised him for doing the right thing and avoided getting drawn into arguments with him. Despite a history of confrontation, this strategy soon paid off because Jacob realised he could not control Ms Plant.
8. Strategies for increasing behaviours	A range of techniques for making it worthwhile for students to be socially amenable, based on the identification and delivery of preferred consequences.	Given that every individual has different preferences, positive response when rewarded with praise or some other reinforcer for pro-social behaviour will indicate successful use of this strategy.	Mr Hussey had noticed that class attention for some students in 4H was very affirming, and a real punisher for others. Sally, for example, sulked when asked to come to the front of the room to receive a sticker. He determined to find other ways to encourage Sally. Michael, on the other hand, was never happier than when he was singled out for attention at the front of the class.
9. Strategies for decreasing behaviours	Techniques used to decrease the likelihood that students will behave inappropriately in the future.	If a student perceives an event such as teacher disapproval to be unpleasant it will be clear from their overall disposition and future behavioural patterns.	Along the same lines, Mr Hussey had noticed that a mildly questioning facial expression was enough to deter Peter from disrupting others. If he used the same technique with Warren, however, it was interpreted as a signal to make more noise and so a definite verbal warning was required.
10. Recognition of individual needs	The effective teacher will ensure that the particular needs, backgrounds and aspirations of individual children are accommodated in their classroom.	By circulating in the class, checking past student records and making every effort to get to know the personalities and dispositions of individuals, student communication and participation will be enhanced.	As often as possible, Mrs Peters made individual contact with her students as they engaged in learning activities, noting their moods, needs and characteristics. By interacting with her students, Mrs Peters maximised the potential for student learning and engagement, and reduced the possibility of disruption.

Source: adapted from Algozzine, Ysseldyke & Elliott, 1997; Arthur-Kelly [illegible] tenson, Ysseldyke & Thurlow, 1989; Conway, 2005; Gore et al., 2001.

BOX 4.3: PATRICIA PUTS IT ALL TOGETHER

Finally, it was all working out for Patricia, our primary school teacher. Although swamped by school-wide expectations and pressures to cover more content, quickly, she had discovered a way forward. She needed to look at the total picture. How could she differentiate the depth of content provided to students and still cover what was expected? At the same time she wanted to trial some changes in her behaviours, especially in questioning and provision of assistance to certain students. The answer came in the form of some creative grouping arrangements, and more particularly, structured cooperative learning strategies that involved all students and ensured the opportunity for intellectual engagement at various levels. By recognising the complexities that characterise the modern classroom, and connecting instructional, curricular, contextual and personal factors, Patricia and her students were once again thriving ...

Establishing personal or situational goals and linking to action research

As a result of working through the three components of the inventory above (also see learning activity 7 later in this chapter and the Appendix at the end of the book for the entire inventory) you may wish to identify particular goals for change in your professional skills. Depending on the nature of these goals (i.e. curriculum, instruction or context), select the chapter(s) in this book that provide the most relevant support and follow up using the additional resources suggested in those chapters. For example, if you find that curriculum is the area in which you identify the most items for attention, you will find useful material in Chapter 5.

We have deliberately not prescribed a format for developing professional goals. Some readers will identify a very specific target for their daily practice (e.g. increase delivery of positive comments about student work), and others will recognise a broader aim (e.g. familiarise themselves with scope and sequence charts in the syllabus documents relevant to their teaching areas).

Some of your goals for change may be best addressed through action research. Action research is accepted to be a vital method for all effective teachers and may be especially valuable for emerging professionals as a means of linking information and skills gained in teacher preparation to daily practices in schools (Smith & Sela, 2005). Action research has been variously defined but for our purposes, it is best considered as a problem-solving technique that practitioners employ to solve their specific challenges. It is localised, down-to-earth and dynamic (see Table 4.4). Action research usually addresses situational factors that require change to maximise student learning. A typical sequence in action research involves the:

- identification of a problem
- definition of a specific need
- development of a plan to address that need
- implementation and evaluation of the plan.

THINK ABOUT THIS

What are some examples of ways you could use action research in educational settings you have experienced?

Several points can be made here. First, action research is data-based. Useful information (e.g. observations, work samples, portfolios, peer ratings) is gathered and decisions are made in light of such data. Second, there is never a clear end in the cycle. The evaluation phase leads to the identification of new challenges, and so the cycle continues. Finally, and perhaps most importantly, it is a 'bottom-up' process. In other words, the research is owned, conducted, monitored and adjusted by the class teacher. In Table 4.4 we see a classroom teacher addressing needs in her secondary classroom through the strategy of action research.

Table 4.4 An example of action research

Step in action research	Example
Identify problem	NOISE! Ms Secombe had collected some written anecdotal data in Weeks 1–4, but it was the comments of colleague teachers and her own anxieties about the type of noise that really worried her.
Define need	In structured group work on most of their Biology topics, 8S were making so much off-task noise that it was disrupting other classes.
Develop plan	Ms Secombe decided to introduce a points system with tangible rewards for the group judged to be most on-task in Biology each week. Noise was allowed but it had to be related to the set activities.
Implement plan	In Week 5, the points system was started with Ms Secombe identifying students working collaboratively, awarding points and ensuring that the promised free time on the Internet was delivered to the winning group.
Evaluate plan	After a month the time required to be on-task by each group before point allocation was increased and more focus was placed on student self-evaluation and group feedback regarding being on-task, in an attempt to reduce reliance on the teacher's rewards.

Summary

In this chapter we have stressed the practical focus of the book by providing a list of items for consideration as you prepare to teach in diverse classrooms. The inventory of recommended classroom practices, discussed in this chapter and listed in the Appendix, will assist you in reflecting on your strengths and identifying your professional needs, with a view to establishing personal goals and relevant action research activities. The following chapters, grounded in real-life case studies and the research literature, set out to support you in the challenge to maximise learning outcomes in your classroom that comprises students with heterogeneous learning needs.

Key concepts

Reflective practice, action research, instruction, curriculum, learning contexts.

LEARNING ACTIVITIES

1 Go to a current issue of the Journal *Reflective Practice* (journalsonline.tandf.co.uk) and select a paper that relates to one of your areas of interest. What implications does this paper have for your professional skills and knowledge?

2 There is a relationship between curriculum, instruction, context and student behaviour in all classrooms. Describe the nature of this relationship in classes you've observed or worked in.

3 How important is it for the teacher to recognise and accommodate individual differences in their students in their planning for learning and teaching? Identify several ways in which this process of differentiation has occurred in classrooms you are familiar with.

4 'If a teacher is dynamic and responsive to student needs, it doesn't matter about the content they cover or the conditions under which they teach: their students will learn regardless'. Discuss this statement with your colleagues.

5 How can schools encourage teachers to engage in action research? What are the barriers and gateways to participation by all personnel?

6 How important are mentors in the development of professional teacher skills and confidence? (See the journal *Mentoring and Tutoring* for useful papers.)

7 Extended activity: follow the steps in Figure 4.1 (page 61) and use the Inventory of Recommended Classroom Practices (Appendix 1) to identify your priorities. The full inventory also links items to later pages of this book and to websites that will assist you in your professional development.

Follow-up resources

Algozzine, B. & Ysseldyke, J. (2003). *Tips for beginning teachers.* Longmont, CO: Sopris West. A practical set of suggestions for best practice grounded in a solid research base. Very useful.

Brophy, J. (Ed.) (1998). *Advances in research on teaching. Expectations in the classroom.* Greenwich, CT: JAI Press. A scholarly and yet accessible resource from a leading authority and eminent contributors.

Greenwood, C.R., Arreaga-Mayer, C. & Carta, J.J. (1994). Identification and translation of effective teacher-developed instructional procedures for general practice. *Remedial and Special Education*, 15, 140–51. An excellent synthesis of best practices for regular classrooms.

Killen, R. (2005). *Programming and assessment for quality teaching and learning.* Melbourne: Thomson. Many valuable Australian examples in an accessible contribution.

Lankshear, C. & Knobel, M. (2004). *A handbook for teacher research: From design to implementation.* Berkshire, UK: Open University Press. A comprehensive and recent guide to how to make research happen in the classroom and beyond.

Lyon, G.R. & Chhabra, V. (2004). The science of reading research and its importance to teaching reading. *Educational Leadership*, 61 (March), 12–17.

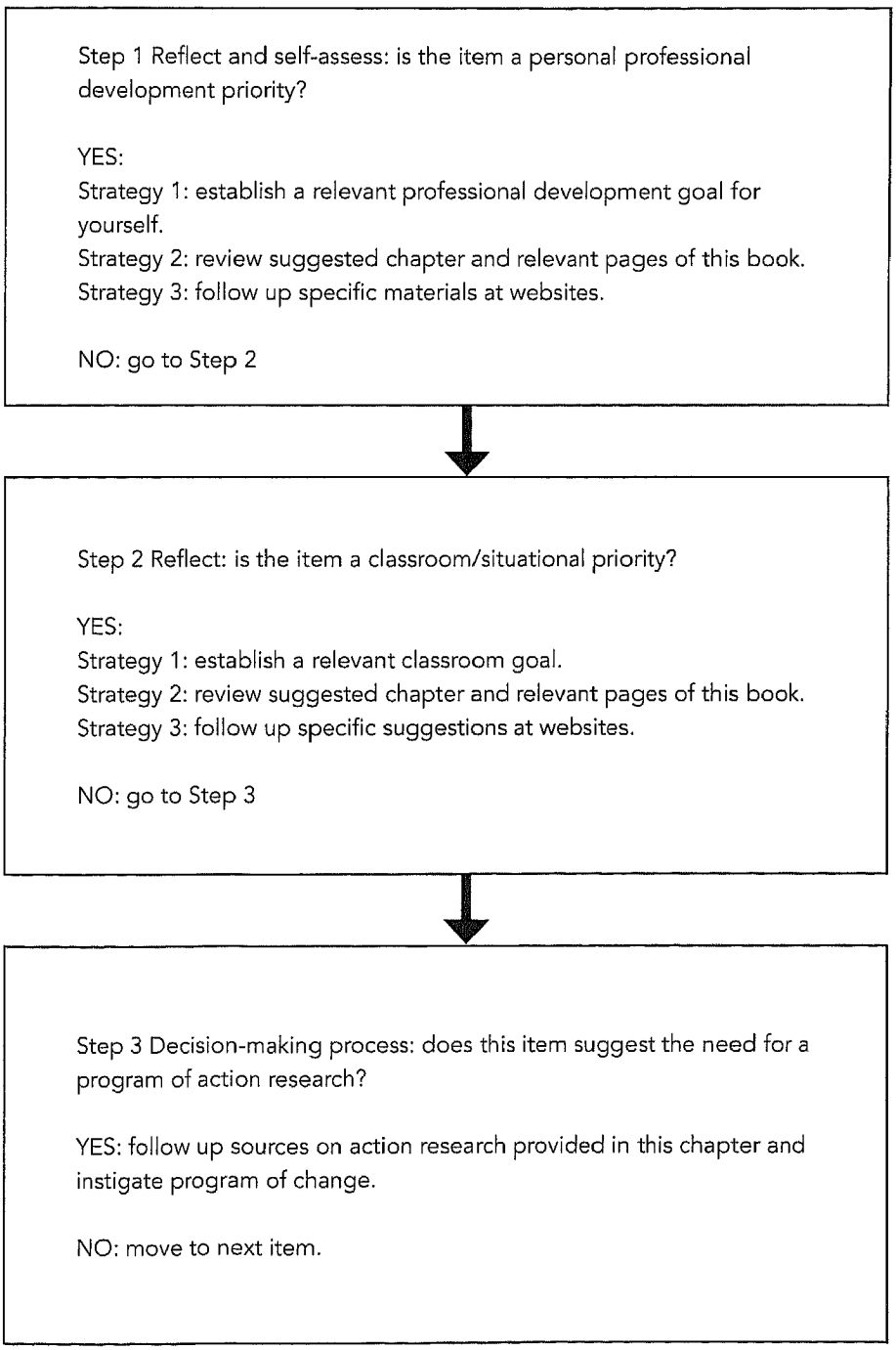

Figure 4.1 The sequence of steps in decision-making that you may wish to follow

Follow-up resources – *Continued*

Lyon, R. (2005). *Evidence-based reading policy in the United States: How scientific research informs instructional practices.* Brookings Papers on Education Policy, pp. 209–50. Two sources that show the connection between research and daily practices.

Warwick, P. & Swaffield, S. (2006). Articulating and connecting frameworks of reflective practice and leadership: perspectives from 'fast track' trainee teachers. *Reflective Practice, 7*, 2, 247–63. This paper links teacher reflection with leadership and explores the process of development as it relates to emerging graduates.

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